

THE COMPUTATION LABORATORY OF HARVARD UNIVERSITY
CAMBRIDGE 38, MASSACHUSETTS



December 21, 1964

Professor Joshua Lederberg
Department of Genetics
Stanford University
Medical Center
Palo Alto, California

Dear Professor Lederberg:

Many thanks for your letter of December 17, as well as for the enclosed reprint.

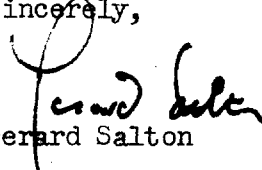
I believe that you are right in saying that there is no redundancy between your work and our graph matching procedures. We have in fact by-passed the canonical form problem by devising a matching process which does not require an initial normalization before matching. However, we might make good use of a canonical form, if one were easily constructible, as an initial screening device, that is, to eliminate from the matching process in advance most of those structures which could obviously never match.

Another question (other than the input screening) which we have not properly solved is the Markush group problem which arises with incompletely specified molecules. This might also cause some problems with the normalization process.

I hope that you will continue to keep us acquainted with your work.

Many thanks again.

Sincerely,


Gerard Salton

GS:jm

G. Salton